



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

09/685,260

10/10/2000

Allen Anthony Klassen

13DV13523

4625

30540

7590

06/04/2004

PATRICK R. SCANLON  
PIERCE ATWOOD  
ONE MONUMENT SQUARE  
PORTLAND, ME 04101

EXAMINER

LAU, TUNG S

ART UNIT

PAPER NUMBER

2863

DATE MAILED: 06/04/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/685,260

Applicant(s)

KLASSEN ET AL.

Examiner

Tung S Lau

Art Unit

2863

-- The MAILING DATE of this communication appears on the cover sheet with the corresponding address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 12 April 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-46 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-3, 5-8, 10-16, 18-21, 23-32, 34-40, 42, 43, 45 and 46 is/are rejected.
- 7) ☒ Claim(s) 4, 9, 17, 22, 33, 41 and 44 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## DETAILED ACTION

### ***Claim Rejections - 35 USC § 102***

- 1a.** The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1, 2, 3, 5, 11 are rejected under 35 U.S.C. 102(b) as being anticipated by Howard et al. (U.S. Patent 5,549,002).

Regarding claim 1:

Howard discloses a method of using a computer to generate an ultrasonic inspection planning for a part, said ultrasonic inspection planning containing information needed to meet specification requirements for an ultrasonic inspection said method comprising: collecting data relating to said ultrasonic inspection planning (Col. 1-2, Lines 60-35); using said data to calculate inspection parameters (Col. 1-2, Lines 60-35); and outputting a set of inspection planning based on said calculated parameters (Col. 1-2, Lines 60-35).

Regarding claims 2, 3, 5, 11:

Howard discloses calculation using geometry data for the part (Col. 1-2, Lines 65-34); line scan image (fig. 3a-5); including ultrasonic characteristic (fig. 3a-5); part curvature correction (fig. 3a-5).

Art Unit: 2863

**1b.** The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 36, 37, 38, 39, 40, 42, 43, 45, 46 are rejected under 35 U.S.C. 102(e) as being anticipated by Barrett et al. (U.S. Patent 6,549,820).

Regarding claim 36:

Barrett discloses a system for automatically generating an ultrasonic inspection planning for a part, said ultrasonic inspection planning containing information needed to meet specification requirements for an ultrasonic inspection, system including means for displaying an input screen for prompting a user to input data relating to the part (Col. 2, Lines 18-63), means for calculating inspection parameters from data (abstract), means for formatting the calculated parameters into an inspection plan document (Col. 4-5, Lines 65-67, , fig. 2, unit 108, 112, fig. 9a).

Regarding claims 37, 38, 39, 40, 42, 43, 45, 46:

Art Unit: 2863

Barrett discloses mean for displaying instruction (fig. 8a); error proofing of the part ((fig. 9a); inspection parameter of parts (fig. 9a); sequence of scan (fig. 8-11); included geometry of the part (fig. 1, unit 11); scan line image (fig. 2, unit 106); sensor characteristic (fig. 2, unit 106); input screen with sequence of inspection (fig. 8a)

***Claim Rejections - 35 USC § 103***

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

a. Claims 12, 6, 8, 10, 13, 14, 16, 18, 19, 20, 21, 23, 24, 25, 26, 27, 29, 30, 31, 32, 34, 35 are rejected under 35 U.S.C. 103(a) as being unpatentable over Howard et al. (U.S. Patent 5,549,002) in view of Barrett et al. (U.S. Patent 6,549,820).

Regarding claims 12, 6, 8, 10, 13, 14, 16, 18, 19, 20, 21, 23, 24:

Howard discloses a method for automatically generating an ultrasonic inspection planning for a part, said ultrasonic inspection planning containing information needed to meet specification requirements for an ultrasonic inspection, said method comprising: displaying an input screen for prompting a user to input data relating to said ultrasonic inspection planning (Col. 1-2, Lines 60-35); calculating

Art Unit: 2863

inspection parameters from said data (Col. 1-2, Lines 60-35), calculate parameter of the part (Col. 1-2, Lines 60-35, Col. 3-4, Lines 35-67), curvature correction (fig. 3-5), part geometry data (Col. 1-2, Lines 60-34), sensor characteristic (fig. 3-5).

Regarding claims 25, 26, 27, 29, 30, 31, 32, 34, 35:

Howard discloses a computer-readable medium containing instructions for controlling a computer system to perform a method comprising: ultrasonic inspection planning containing information needed to meet specification requirements for an Ultrasonic inspection (Col. 1-2, Lines 60-35); calculating inspection parameters from said data (Col. 1-2, Lines 60-35); geometry data (fig. 4,5); flow line image (fig. 3a-3c); characteristic of the sensor (fig. 3a-3c);

Howard does not disclose the use of a plan document, displaying an input screen for prompting a user to Input data relating to an ultrasonic inspection planning for a part; error plot drawing, sequence of inspection scan, instruction screen; Barrett discloses the use of a plan document (Col. 4-5, Lines 65-66), displaying an input screen for prompting a user to Input data relating to an ultrasonic inspection planning for a part (Col. 4-5, Lines 65-66, fig. 2, unit 108, 112, fig. 9a), error plot drawing (Col. 21, Lines 1-11), sequence of inspection scan (fig. 8-11), instruction screen (fig. 8a), in order to produce graphs and

Art Unit: 2863

statistical data showing trends and other information about the parts (Col. 2, Lines 50-53).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Howard to have the use of a plan document, displaying an input screen for prompting a user to Input data relating to an ultrasonic inspection planning for a part; error plot drawing, sequence of inspection scan, instruction screen taught by Barrett in order to produce graphs and statistical data showing trends and other information about the parts (Col. 2, Lines 50-53).

**b.** Claims 7, 15, 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Howard et al. (U.S. Patent 5,549,002) and Barrett et al. (U.S. Patent 6,549,820) and further in view of Dwyer (U.S. Patent 6,279,397).

The Howard and Barrett combination disclose a method, computer readable medium including the subject matter discussed above except the use of rotating speed; Dwyer discloses the use of rotating speed (Col. 10, Lines 43-61), in order to improve detecting flow in the part (abstract).

Art Unit: 2863

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Howard and Barrett to have the use of rotating speed taught by Dwyer ), in order to improve detecting flow in the part (abstract).

### ***Claim Objections***

3. Claims 4, 9, 17, 22, 33, 41, 44 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all the limitation of the base claim and any intervening claims.

The following is an examiner's statement of reasons for allowance: prior art fail to teach the use of revision history.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

### ***Response to Arguments***

4. Applicant's arguments filed 4/12/2004 have been fully considered but they are not persuasive.

A. Applicant argues in the lengthy arguments that the prior art does not show the 'inspection planning'. Howard discloses 'inspection planning' in Col. 1-2, Lines



Art Unit: 2863

60-35, fig. 1, unit 10, Col. 2, Lines 35-40, Barrett discloses 'inspection planning' in abstract.

**B.** Applicant continue to argue in the lengthy arguments that the prior art does not show the 'collecting data relating to an ultrasonic inspection planning, using that data to calculate inspection parameters, and outputting a set of inspection based on the calculated parameters'. Howard discloses 'collecting data relating to an ultrasonic inspection planning, using that data to calculate inspection parameters, and outputting a set of inspection based on the calculated parameters' in Col. 1-2, Lines 60-35, fig. 1, unit 26, fig. 6a, 6b.

**C.** Applicant continue to argue in the lengthy arguments that the prior art does not show the 'displaying and input screen for prompting a user to input data relating to the part'. Barrett discloses 'displaying and input screen for prompting a user to input data relating to the part' in Col. 4-5, Lines 65-66, fig. 2, unit 108, 112, fig. 9a.

**D.** Applicant continue to argue in the lengthy arguments that the prior art does not show the 'rotating speed'. Dwyer shows the 'rotating speed' in Col. 10, Lines 43-61.

Reminds to the applicants that during patent examination, the pending claims must be "given the broadest reasonable interpretation consistent with the specification." Applicant always has the opportunity to amend the claims during prosecution, and broad interpretation by the examiner reduces the possibility that

Art Unit: 2863

the claim, once issued, will be interpreted more broadly than is justified. In re Prater, 415 F.2d 1393, 1404-05, 162 USPQ 541, 550-51 (CCPA 1969).

While the meaning of claims of issued patents are interpreted in light of the specification, prosecution history, prior art and other claims, this is not the mode of claim interpretation to be applied during examination. During examination, the claims must be interpreted as broadly as their terms reasonably allowed. This means that the words of the claim must be given their plain meaning unless applicant has provided a clear definition in the specification. In re Zletz, 893 F.2d 319, 321, 13 USPQ2d 1320, 1322 (Fed. Cir. 1989).

### ***Conclusion***

**THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

Art Unit: 2863

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tung S Lau whose telephone number is 703-305-3309.

The examiner can normally be reached on M-F 9-5:30.

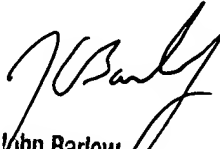
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Barlow can be reached on 703-308-3126. The fax phone numbers for the organization where this application or proceeding is assigned are 703-308-5841 for regular communications and 703-308-5841 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-0956.

TC2800 FAX Telephone Numbers: 703-872-9306

TC2800 Customer Service FAX - (703) 872-9317

TL

  
John Barlow  
Supervisory Patent Examiner  
Technology Center 2800